1 INTRODUCTION

A. Background

In his book *The Next American Metropolis,* Peter Calthorpe writes "pedestrians are the catalyst which makes the essential qualities of communities meaningful." Indeed, pedestrians fill the Bay Area's civic spaces, activating our parks and sidewalks, plazas and cafes, downtowns and shopping districts. Yet a recent study by the Surface Transportation Policy Project (STPP) reports that pedestrian safety continues to be compromised throughout the nation, with nearly 5,000 pedestrian deaths in 2003.[1] Another 70,000 pedestrians are injured in accidents each year. The news is better in the San Francisco Bay Area however, where STPP reports that pedestrian safety is improving. The Bay Area's Pedestrian Danger Index (PDI) improved by 13 percent between 2002 and 2003, indicating a decrease in pedestrian fatalities and injuries.[2]

From pedestrian flag waving and illuminated crosswalks in Berkeley to scramble signals in Oakland, the Bay Area is rich with examples of innovative pedestrian planning efforts. A small number of cities, such as Oakland and San Francisco, have prepared or are working on pedestrian master plans for their communities, some of the only such plans in the State. A larger number of jurisdictions, including Union City, Fremont and Marin County, are preparing or have prepared combined bicycle and pedestrian master plans. Jurisdictions are also addressing pedestrian planning issues in their general plans and in planning documents for individual neighborhoods, such as downtowns or transit nodes. Bay Area transit providers are completing strategic plans and guidelines to improve pedestrian travel to transportation options.

In addition to the work of these local government, pedestrian planning has become a policy mandate for many federal, State and regional agencies. The Federal Highways Administration (FHWA) recently released program guidance communicating their expectation that every transportation agency ac-

[1] Surface Transportation Policy Project, *Mean Streets 2004: How Far Have We Come?*, November 2004, page 6.

[2] Surface Transportation Policy Project, *Mean Streets 2004: How Far Have We Come?*, November 2004, page 15.

commodate walking as a routine part of their activities. The California Department of Transportation issued a policy directive that requires all regional agencies, including Congestion Management Agencies (CMAs), to consider pedestrians and bicyclists in all programming and planning activities.

B. The Bay Area Pedestrian Districts Study

Against this larger backdrop, the Metropolitan Transportation Commission (MTC) commissioned the *Bay Area Pedestrian Districts Study* to encourage and improve pedestrian planning in the Bay Area. The goal of the *Pedestrian Districts Study* is to explore the use of pedestrian districts as a concept for creating better pedestrian environments in the Bay Area. Through the development of the pedestrian district typologies and real-life case studies, the study identifies the types and costs of pedestrian facilities that have the greatest impact on improving the pedestrian environment. MTC will use this information to prioritize needed pedestrian improvements in the region, and assist local jurisdictions in developing, prioritizing and quantifying pedestrian projects in their communities.

The study was a close collaboration between the consulting team lead by Design, Community & Environment (DC&E) with its subconsultant W-Trans, MTC staff and a Technical Advisory Committee (TAC) comprised of staff from the planning, public works and public health departments of Bay Area cities and counties as well as representatives from local transit agencies and pedestrian advocacy groups.

A first step for the TAC and project staff was to agree on a definition of a pedestrian district. For purposes of this study, tedestrian districts are defined as a place where walking is prioritized as a mode of travel. A district can be an entire neighborhood (like Downtown Berkeley) or a node within a neighborhood (such as 14th and Broadway in Downtown Oakland). Pedestrian districts can also be linear (such as College Avenue in Berkeley). Pedestrian districts can abut and overlap. The *Pedestrian Districts Study* can help

pedestrian districts become a term of art, one that is considered an accolade and a type of community that jurisdictions aspire to create.

This report constitutes the final work product of the *Pedestrian Districts Study*. As described in more detail below, the report contains four of the major work products prepared by DC&E and W-Trans for the *Pedestrian Districts Study*. A fifth work product, an overview of pedestrian planning efforts in the Bay Area, is incorporated by reference as Appendix B.

C. Report Summary

This final report contains the major components described below.

1. Introduction and Report Overview.
Chapter One is this introduction, which provides background about the *Pedestrian Districts Study* and a summary of the major work products.

2. Pedestrian District Typologies
Chapter Two describes a typology of pedestrian districts that exist in the Bay Area. The typologies help describe the types of pedestrian districts that exist in the region. As is explained in more detail in Chapter Two, the ten identified typologies are based on variables that most clearly define the built environment and pedestrian experience in each type of district. In concert with the case studies presented in Chapter Three, the typologies will help jurisdictions understand what type of pedestrian facilities are most appropriate in different types of neighborhoods

The ten typologies identified are described briefly below and in more detail Chapter Two of this report.

- **Urban Residential.** The Urban Residential typology applies to the Bay Area's higher-density residential neighborhoods. Examples of this typology would most typically be found in the largest Bay Area cities.

- **Pedestrian-Oriented Suburban Residential.** The Suburban Residential typology applies to lower-density suburban neighborhoods that were explicitly designed to be pedestrian-oriented. Though this typology is not very common in the Bay Area today, it provides a model for what Bay Area cities that are experiencing significant residential growth should aspire to achieve.
- **Major Mixed-Use District.** The Major Mixed-Use District typology is fairly common in some of the larger Bay Area cities and applies to neighborhoods that are not a City's downtown, but nonetheless contain a fairly dense mix of housing and commercial uses and are well-served by transit.
- **Transit Village.** The largest of the Bay Area's transit-oriented developments are represented by the Transit Village typology. These districts have pedestrian environments that are very much oriented as a node at a major transit stop (usually BART).
- **Large Neighborhood Corridor.** There are neighborhoods in the Bay Area that are recognizable districts along an important neighborhood street, such as portions of International Boulevard in Oakland. The defining corridor in this district is either a major regional corridor or a very busy arterial street.
- **Major City Downtown.** The Major City Downtown typology applies almost exclusively to the Bay Area's three major cities: San Francisco, Oakland, and San Jose. They include numerous high-rise buildings, are major employment and retail centers and may have a significant amount of residential uses.
- **Medium-Sized City Downtown.** The Medium-Sized City Downtown typology applies to a large number of Bay Area downtowns, including those in Berkeley, Santa Rosa, San Rafael and Walnut Creek. These are typically cities with populations between 50,000 and 150,000.
- **Small Downtown or Local Commercial District.** The Small Downtown and Local Commercial District typology applies to many of the local-serving commercial districts in Bay Area communities. Small down-

towns like Suisun City and Mill Valley have similar characteristics to smaller retail districts within larger cities. These districts can either be nodes or along a corridor, and typically include one street that is considered "Main Street."

- **Urban Institutional.** The Urban Institutional pedestrian district typology may exist where a major institution or concentration of institutions are present in an urban environment, and serve as the major attractor to the area. Major institutions may include large government centers, hospitals, and universities.
- **Suburban Employment Center.** The Suburban Employment Center applies to areas with a concentration of employers, or a single large employer in a campus-like development, in the Bay Area's less urban cities such as along the I-680 and U.S. 101 corridor in the South Bay. Like the Suburban Residential typology, there may not be many successful examples of this pedestrian district typology currently in the Bay Area, but the typology serves as a model for how these areas, or new office development, could become real pedestrian districts in the future.

3. Pedestrian District Case Studies and Cost Estimates

Chapter Three of this report presents ten case studies of pedestrian districts in the Bay Area, as listed in Table 1-1 below. The purpose of the case studies is to provide Bay Area cities and counties with models of effective pedestrian districts and to provide direction for how they can create similar environments in their communities.

Each case study describes the key pedestrian facilities that exist in the district, its major attractors and generators of pedestrian activity and a summary of the planning history and regulatory framework that helped shape the area. They also include the key pedestrian facilities that exist in the district. Each case study includes key findings about why the area succeeds (or in some cases does not succeed) as a pedestrian district.

Table 1-1 **Case Study Sites**

Case Study Site	County	Corresponding Typology
1. Adam's Point, Oakland	Alameda	Urban Residential
2. Waterfront District, Hercules	Contra Costa	Pedestrian-Oriented Suburban Residential
3. Telegraph Avenue, Berkeley	Alameda	Major Mixed-Use District
4. Fruitvale BART Station TOD, Oakland	Alameda	Transit Village
5. San Pablo Avenue, West Berkeley	Alameda	Large Neighborhood Corridor
6. Downtown San Jose	Santa Clara	Major City Downtown
7. Downtown Santa Rosa	Sonoma	Medium-Sized City Downtown
8. Downtown Suisun City	Solano	Small Downtown or Local Commercial District
9. UCSF Medical Center	San Francisco	Urban Institutional
10. Hacienda Business Park, Pleasanton[1]	Alameda	Suburban Employment Center

Chapter Three also includes a ballpark cost estimate of what it would cost in 2005 dollars to create the pedestrian district today. The cost estimate is provided on a per-linear-foot basis. The detailed cost estimates for each case study site that informed these calculations are included in Appendix A. These detailed cost estimates provide approximate costs for each roadway or major component of the district (such as a pedestrian plaza or paseo), including estimates of the numbers of pedestrian facilities. Appendix A also contains a description of the methodology used for completing the cost estimates.

4. Generic Cost Estimating Template

Chapter Four contains a generic cost estimating template that jurisdictions can use as a planning tool to prepare conceptual cost estimates for pedestrian improvement projects. The generic template is designed to be interactive;

cities and counties can use the Excel spreadsheet to input local information about quantities of desired facilities and get a ballpark budget for a set of pedestrian improvements. The template is a menu of commonly uses items and their approximate costs; final cost estimates for real capital projects should be prepared by trained engineers. The template will be available for download on MTC's pedestrian planning website[3]. The cost estimates prepared for the case studies included in Chapter Three and in Appendix A relied on this template.

5. Next Steps

Chapter Five includes several recommended next steps that MTC can take for using this study and encouraging and assisting better pedestrian planning in the Bay Area.

6. Report Preparers

Chapter Six includes a list of the preparers of this report and contributors to the *Pedestrian Districts Study.*

Appendix A: Detailed Cost Estimates for Case Study Sites

Appendix A contains a detailed breakdown of costs for each case study site by roadway and type of pedestrian facility. Appendix A also includes details about the methodology and assumptions that informed the cost estimates.

Appendix B: Overview of Bay Pedestrian Planning

Appendix B, a separate volume, contains an overview of pedestrian planning in the Bay Area. The purpose of this report, the first work product resulting from the *Pedestrian Districts Study,* is to provide a summary of the types of pedestrian planning occurring in the Bay Area. It is not intended as an exhaustive inventory of all pedestrian planning efforts in the Bay Area. Rather, it is a survey of how and in what form pedestrian planning is being addressed by Bay Area cities and counties. It also includes a summary of funding avail-

[3] Pedestrian resources, including resources from this study, can be found on the MTC website at www.mtc.ca.gov/planning/bicyclespedestrians/index.htm

able for pedestrian planning efforts, and a discussion of how cities and counties use advisory working groups, such as pedestrian advisory communities (PACs) to guide their pedestrian planning work.

D. How To Use This Report

The *Pedestrian Districts Study* is intended to assist a wide variety of planning professionals at a ride range of geographic levels in pedestrian planning efforts.

- **City and county planners at the local level** can use the typologies in Chapter Two and the case studies in Chapter Three to identify pedestrian improvements that might be most appropriate for their communities, given comparable local conditions related to roadway size, transit use, built environment and pedestrian activity. The study can provide examples of pedestrian-oriented neighborhoods that other communities might aspire to be, and provide detailed information about how some of the successes described in the case studies can be emulated elsewhere. The information on regulatory constraints, and tools for overcoming these constraints, described in Chapter Three can also help local planners ensure that the appropriate land use policies are in place to create truly pedestrian-oriented neighborhoods. Finally, the cost estimates in Chapter Three and Appendix A can help planners prepare conceptual budgets for pedestrian improvement projects to secure adequate funding for projects.
- **Planners at the regional agencies such as MTC and county CMAs** can use the cost estimates as a "reality check" when making decisions about funding applications and the adequacy of proposed budgets. The case studies can help regional planners prioritize projects based on the findings of what works and what doesn't work at the ten different case study sites. As the whole, the study can help further the discussion about regional pedestrian needs.
- **Traffic engineers and other public works staff** can use some of the more innovative pedestrian planning tools identified in the case study to

help identify specific facilities for new streetscape capital projects. The study can also help inform roadway planning and design, providing models for pedestrian-oriented streets.

- **Pedestrian advocates** can use the cost estimates to help lobby for adequate funding from local and regional planning agencies.